

The opinion in support of the decision being entered today was not written for publication and is not binding precedent of the Board.

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Paper No. 21

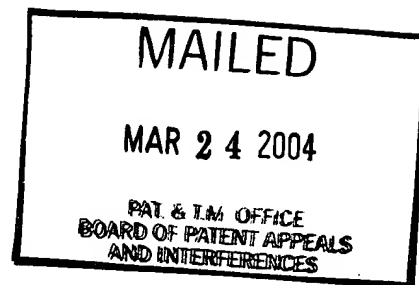
UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE BOARD OF PATENT APPEALS
AND INTERFERENCES

Ex parte BING-BING CHAI

Appeal No. 2002-2160
Application No. 09/377,383

ON BRIEF



Before RUGGIERO, DIXON, and BLANKENSHIP, Administrative Patent Judges

BLANKENSHIP, Administrative Patent Judge.

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DECISION ON APPEAL

This is a decision on appeal under 35 U.S.C. § 134 from the examiner's final rejection of claims 1-13, which are all the claims in the application.

We reverse.

BACKGROUND

The invention relates to digital multimedia communications, and is directed to apparatus and a method forming a data structure that, according to appellant, improves error resilience when applied to the coding of wavelet transform coefficients. Claim 1 is reproduced below.

1. A data structure stored on a computer readable medium comprising:
a packet header; and
a payload having at least one texture unit consisting only of AC coefficients from a single subband of a hierarchical subband decomposed image.

The examiner relies on the following reference:

Shapiro

5,563,960

Oct. 8, 1996

Claims 1-13 stand rejected under 35 U.S.C. § 102 as being anticipated by Shapiro.

We refer to the Final Rejection (Paper No. 6) and the Examiner's Answer (Paper No. 14) for a statement of the examiner's position and to the Brief (Paper No. 13) and the Reply Brief (Paper No. 16) for appellant's position with respect to the claims which stand rejected.

OPINION

In the statement of the section 102 rejection against claims 1 and 9, the examiner asserts that Shapiro discloses a packet header (38, Figs. 1-2; 54, Fig. 2) and a payload (40, Figs. 1-2; 54, Fig. 2). The payload is found to have at least one texture unit only of AC coefficients from a single subband of a hierarchical subband decomposed image, relying on Figure 3, column 3, lines 48 through 49 and column 4, lines 1 through 28 of the reference. (Answer at 3.)

In appellant's view, Shapiro teaches a particular method of image processing to produce an encoded image for packetization, but the reference is completely silent as to how packetization of the encoded image should be accomplished. Appellant argues that the wavelet decomposition described by Shapiro does not teach or suggest packetizing at least one texture unit consisting only of AC coefficients from a single subband of the hierarchical image. (Brief at 9.)

The examiner responds that the term "bit stream" includes, or refers to, a payload. Further, the examiner contends that, as taught in Figure 3 and column 4, lines 8 through 22 of Shapiro, an encoded data of "HH1", for example" refers to payload having a texture unit consisting only of AC coefficients from a single subband of a hierarchical subband decomposed image. (Answer at 6.) Appellant responds, in turn, that any encoding taught by Shapiro is not equivalent to packetizing a bitstream into one or more packets. "Packetization encapsulates encoded bitstreams into packets for

transportation and have criticalities that [are] completely different from the encoding process." (Reply Brief at 2.)

We find that appellant's arguments are better supported by the record than those presented by the examiner. Appellant's description of the background of the invention (spec. at pp. 1-2) refers to packet headers and associated payloads that are specific to transport over communication channels. In particular: "For example, MPEG defines a packet as consisting of a header followed by a number of contiguous bytes (payload) from an 'elementary data stream'. An elementary stream is simply a generic term for one of the coded video, coded audio or other coded bitstreams." (Id. at 1, ll. 24-28.)

Appellant's specification thus provides evidence that the artisan considered a packet header and payload to be distinct in structure and purpose from bitstreams of coded video or audio, and that the payload encompassed coded bitstreams. While an applicant's description of the prior art appearing in the disclosure would not necessarily be conclusive as to showing the recognized meanings of terms of art, the examiner has provided no evidence that the terms "packet header" and "payload" have meaning in the art different from that described in the instant specification.

The reference teaches:

The transmitter means 36 organizes the bit stream representative of the encoded image having one or more enhanced regions. The bit stream comprises header bits 38 representative of the mean, the identity of the selected regions and the corresponding scaling factors and data bits 40 representative of the encoded image.

In FIG. 2 a system for decoding a transmitted or stored image to reconstruct the original image to the extent possible given the number of bits transmitted or stored is illustrated. In FIG. 2 the decoder 50 comprises receiver means 52 which receives an incoming bit stream 54 which itself comprises header bits 38 representative of the mean, the identity of the selected regions and the corresponding scaling factors, the image dimensions and data bits 40 representative of the encoded image.

Shapiro col. 3, ll. 42-57.

The "header bits" and "data bits" shown in Figures 1 and 2 of the reference thus refer to content of encoded images. The reference provides no details of bit stream 54, other than that it contains the encoded image information. Shapiro does not appear to use the term "packet" or "payload." The reference appears to contemplate an ideal (i.e., perfect) communication channel between encoder 10 and decoder 50, with the details of packetization being unrelated to disclosure of the invention.

Moreover, even if we were to disregard the meanings of "packet header" and "payload," we agree with appellant, in view of the arguments advanced in the Brief, that the section 102 rejection of each independent claim would fail. *

Shapiro describes hierarchical subband decomposition similar to that in appellant's description of the prior art in the specification. However, the rejection does not sufficiently explain or show, for example, how "at least one texture unit consisting only of AC coefficients from a single subband of a hierarchical subband decomposed image," as required by instant claim 1, may be disclosed by the description of wavelet hierarchical subband decomposition at column 4, lines 1 through 28 of Shapiro.

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To the extent that the rejection may be based on the principles of inherency -- since Shapiro does not expressly describe that which is claimed -- we note that our reviewing court has set out clear standards for a showing of inherency, which have not been attained in the instant case. To establish inherency, the extrinsic evidence "must make clear that the missing descriptive matter is necessarily present in the thing described in the reference, and that it would be so recognized by persons of ordinary skill." In re Robertson, 169 F.3d 743, 745, 49 USPQ2d 1949, 1950-51 (Fed. Cir. 1999) (citations omitted).

We are persuaded by appellant that the section 102 rejection of each claim on appeal is in error. We thus do not sustain the rejection of claims 1-13 under 35 U.S.C. § 102 as being anticipated by Shapiro.

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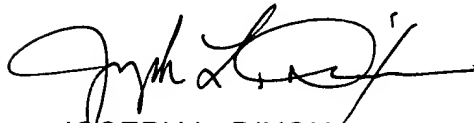
CONCLUSION

The rejection of claims 1-13 under 35 U.S.C. § 102 is reversed.

REVERSED



JOSEPH F. RUGGIERO
Administrative Patent Judge



JOSEPH L. DIXON
Administrative Patent Judge



HOWARD B. BLANKENSHIP
Administrative Patent Judge

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